

Application No.: 10/567,893  
Amendment Dated: March 6, 2009  
Reply to Office Action of: December 11, 2008

MAT-8801US

**Amendments to the Title:**

Please replace the Title with the following:

DISTURBING SIGNAL DETECTING DEVICE FOR DETECTING A DISTURBING  
SIGNAL AND OFDM RECEIVER USING THE SAME

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**Amendments to the Specification:**

Please replace the paragraph, beginning at page 12, line 17, with the following rewritten paragraph:

Tuner 1 selects an OFDM signal received. A/D converter 2 converts a signal selected by the tuner to a digital signal and outputs it. Orthogonal detector 3 orthogonally detects an OFDM signal and output it. FFT computing unit 4 converts a signal obtained from orthogonal detector 3 to a frequency-domain signal and outputs it. Pilot extractor 5 extracts a pilot signal periodically inserted into the OFDM signal. Pilot extractor 5 further compares the pilot signal extracted with a reference value, calculates the transmission line characteristic 50 of a carrier including the pilot signal, and outputs it. Transmission line estimating part 6 interpolates timewise and frequencywise the transmission line characteristic 50 of the carrier in which the pilot signal calculated by pilot extractor 5 existed, calculates an estimate for the transmission line characteristics of all OFDM carriers, and outputs it. Divider 7 divides the signal converted to the frequency-domain signal by FFT computing unit 4, by the estimate for the transmission line characteristic estimated by transmission line estimating part 6, and outputs the result.